#### **BEFORE THE**

### OCCUPATIONAL SAFETY AND HEALTH APPEALS BOARD

#### DEPARTMENT OF INDUSTRIAL RELATIONS

#### STATE OF CALIFORNIA

In the Matter of the Appeal of:

DOCKETS 96-R4D2-211 and 212

**EVANS EXTERMINATING CO., INC.** 1616 Burbank Boulevard, Suite H Burbank, CA 91560

**Employer** 

**DECISION** 

## **Background and Jurisdictional Information**

Employer is a construction company. On January 9, 1996, the Division of Occupational Safety and Health (the Division), through Joel Foss, Safety Engineer, conducted a permit inspection at a place of employment maintained by Employer at 4115 Berenice Place, Los Angeles, California (the site). On January 12, 1996, the Division cited Employer for an alleged regulatory violation of § 341.1(a) [excavation permit], which was amended to add an item that was not appealed, and an alleged serious violation of § 1541.1(a)(1) which was subsequently amended on February 16, 1996, to allege a serious violation of Section 1541(i)(2) (stability of adjacent structures) of the California industrial safety orders found in Title 8, California Code of Regulations.¹ The Division proposed a \$875 civil penalty for Item 1 and a \$2,625 civil penalty for Citation 2.

Employer filed a timely appeal to the amended citations contending that the safety orders were not violated and the classification of Citation 2 was incorrect.

This matter came on regularly for hearing before Bref French, Administrative Law Judge for the California Occupational Safety and Health Appeals Board, at West Covina, California, on February 25,

 $<sup>^{\</sup>scriptscriptstyle 1}$  Unless otherwise specified, all references are to sections of Title 8, California Code of Regulations.

1997. Employer was represented by Robert Evans, Owner. The Division was represented by Joel Foss, Safety Engineer. Oral and documentary evidence was introduced by the parties and the matter was submitted on February 25, 1997.

### **Docket 96-R4D2-211**

Citation 1, Regulatory, § 341.1(a)

### Docket 96-R4D2-212

Citation 2, Serious, § 1541(i)(2)

### **Summary of Evidence**

In Citation 1, Employer was cited for not obtaining a permit from Cal/OSHA for an excavation which was five feet or deeper and into which employees were required to descend.

In Citation 2, Employer was cited for allowing employees to work in an excavation below the level of the base or footing of a retaining wall where the excavation was not in stable rock and Employer did not ensure the safety of its employees because it failed to comply with the shoring system provided by a registered professional engineer.

Joel Foss testified for the Division that as an associate safety engineer he received an inquiry from a home owner's agent regarding the Division's permit requirements for construction of a new retaining wall in front of an existing retaining wall. After receiving a modified retaining wall detail (Exhibit 4) from the home owner's structural engineer, Gwynne Pugh, he approved and on November 9, 1995, issued an exemption (Exhibit 5) from the construction activity permit requirements. The exemption was subject to the following conditions: (1) "no excavation on site five feet in depth" and (2) "the existing retaining wall intact and foundation not to be compromised by excavation for foundation of new wall."

A few days before January 9, 1996, Mr. Foss received a phone call from a Los Angeles city grading inspector at the home owner's premises who advised him that there was no foundation for the existing retaining wall, only "rubble, with the footing exposed." Thereafter, on January 9, 1996, Mr. Foss conducted an inspection at the site where he met with Robert Evans and the home owner's agent. The agent provided him with a shoring detail (Employer's Exhibit B), signed and stamped by Gwynne Pugh and by a certified engineering

geologist, Robert Sousa, on December 27, 1995. Inspector Foss photographed the existing retaining wall (Exhibits 9 through 13) to document his determination that the shoring system in place did not match the shoring detail requirements.

The shoring detail (Employer's Exhibit B) provided that the existing retaining wall be shored up with rakers or diagonal braces which were double 2 inch by 6 inch pieces of wood (hereinafter referred to as " $2 \times 6$ ") bolted together 6 inches on center, to hold a horizontal ledger up against the existing wall. It also called for  $4 \times 4$  posts driven down into the wall to support the ledger and  $4 \times 4$  driven posts or 2 inch pipes, bolted to the post, and extended as necessary, to pour the concrete slab around it to support the braces.

Photograph Exhibits 11 and 12, which depict where the braces land opposite the wall at the end where support for the braces lies, show that the braces were not supported by 4 x 4 driven posts or 2 inch pipes, as called for in the shoring detail. The braces were supported by two steel form stakes driven into the ground along side the braces. He opined that the structural value of the braces was negligible since it was dependent only on the sheer strength of the soft iron nails holding the stakes in place.

Photograph Exhibit 13 depicts a damaged pilaster that had been chipped away. Pilasters are vertical columns that extend out from and are part of the existing wall. They provide lateral stability by stiffening the wall. The existing retaining wall was also damaged by over-excavating in that the excavation was dug deeper than intended by the structural engineer so that the foot or base of the foundation was exposed.

Mr. Evans provided a list of the employees that were working at the excavation site (Exhibit 18) and stated that his employees dug the excavation and were working in it at its deepest point in the "slot" or "key." Mr. Foss measured the depth of the excavation from the top of the rebar, which was a few inches below the patio slab next to the excavation, to the bottom of the slot at "approximately" 5 ft. The top of the rebar was "a matter of two or three inches maximum below the level of the patio cement." Since the existing retaining wall, which was holding back soil that could collapse into the excavation, added an additional 7 ft. when measured from the rebar up to the top of the retaining wall, he determined that the overall height on that side of the excavation was approximately 12 ft.

Based on these conditions, Mr. Foss concluded that the existing retaining wall, which was built in 1910, was part of the protective system required under § 1540 to support the sides of an excavation 5 ft. or more in depth. Because employees were excavating at depths from 5 ft. to 12 ft. and Employer did not obtain a permit from Cal/OSHA, he cited Employer for a regulatory violation of § 341.1(a). He proposed a \$875 civil penalty.

The Division subsequently amended Citation 2 to allege a serious violation of § 1541(I)(2) with the proposed civil penalty to remain at \$2,625. Mr. Foss opined that based on his experience, when excavations collapse they usually do so rapidly and earth striking an individual will cause death or a serious injury that requires hospitalization in excess of 24 hours. He has investigated six excavations that collapsed with four fatalities and two instances where protective systems similar to this one failed. In one case, an individual was crushed but survived after being extricated with a back hoe.

Robert Sousa testified for the Division that he is employed by GeoConcepts, Inc., as an engineering geologist and is licensed by the state as a registered geologist, certified engineering geologist, and environmental assessor. On August 14, 1995, he prepared a Limited Geologic and Soils Engineering Investigation report (Exhibit 6) for a proposed retaining wall at the site. The report includes the statement that "All excavations should be stabilized within 15 days of initial excavation. If this time is exceeded, the project soils engineer must be notified, and modifications, such as shoring or slope trimming may be required." He stated that the contractor must "abide by the 15 day rule" and if he excavates, complete the project within 15 days, or have it shored, unless the excavation is inspected by the structural engineer and he allows the work to continue based on his observations.

In December, 1995, either Employer or the home owner's agent contacted him to review the footing excavation. On December 26, 1996, Mr. Sousa visited the site and observed that the retaining wall was damaged and leaning towards the house. Four pilasters were missing which removed the support that they would have provided. He determined that the footing excavation complied with a recently revised footing detail. He prepared a Geologic Addendum Report (Exhibit 7), dated December 26, 1996, which he stated, governed the continuing project and contained certain mandatory provisions. The report stated that "The foundation excavation/existing retaining wall shall be shored as required by the City of Los Angeles in Reference 1 (Review letter by

the City of Los Angeles, Department of Building and Safety, dated December 21, 1995.]. The report also notes that "A OSHA Permit shall be obtained prior to resuming work as required by the City."

Photograph Exhibit 17, which he took on December 26th, shows the excavation and existing retaining wall and depicts the exposed retaining wall foundation. He stated that the foundation or footing was exposed to a depth of 18 inches with bedrock below it (as marked by him on Exhibit 17). The key or "trough", which is a deeper excavation than the footing, is depicted in the middle of the photograph.

Mr. Sousa testified that as of December 26, 1995, the existing retaining wall was an adequate protective system, as noted in his report (Exhibit 7: page 2). However, he explained that "it is a question of the time period. The excavation cannot remain open and not [be] braced. By December 26th, it has gone the period of time where it becomes highly questionable, something needed to be done. That is why the December 26, 1995, report was written." He further opined that "by December 26th it was highly questionable whether the existing retaining wall was an adequate protective system because it was beyond the 15 days, the excavation was much deeper at that time (a total of 5.5 ft) and there was non-compacted fill that was exposed in the footings."

Mr. Sousa also reviewed a shoring detail prepared by Gwynne Pugh (Exhibit B), which he signed and stamped on December 27th before returning it to the homeowner's agent. He opined based on his training and experience as a geologist, that if the provisions outlined in his addendum (Exhibit 7) and the shoring detail instructions were not followed, it could reasonably be expected that this could pose a hazard to employees or others who were working or standing below the existing retaining wall.

At the time of the original report in 1995 (Exhibit 6), test bores were done which revealed natural soil (as depicted in Plate 2) and "fill" to the bottom of the base of the existing retaining wall (Plate 3). "Fill" is a combination of soil and rock that man has placed in a specific location: it is not natural. The exploration hole dug behind the retaining wall revealed bedrock fragments, charred debris and fill (as noted on "Exploration: TP 1": Exhibit 6). Therefore, he stated that the excavation is not solely in bedrock or all in stable rock. He explained that the excavation for the proposed retaining wall footing exposed competent bedrock and dumped fill. Below the footing (depicted in Exhibit 17) there is competent bedrock throughout most of the excavation, however, there are portions that expose non-compacted fill.

Mr. Sousa stated that his review letter (Exhibit 7), references the total depths of both ends of the excavation. He testified that the total or maximum depth on one end was 5.5 ft. and on the other end, 5 ft. Those were the minimum depths required, based on the structural detail, which means that they had to dig deeper to get into competent material or bedrock at different locations. He observed that as of December 26th, the excavation was dug to the maximum depths.

Robert Evans, owner of Evans Terminating Co., Inc., testified for Employer that when he was asked by the agent for the owner to construct a new retaining wall, he was concerned about conforming to Cal/OSHA's standards since he had never been involved with their regulations and standards. The home owner's agent gave him the exemption letter (Exhibit A and Division's Exhibit 5) which stated "No excavation 5 ft in depth." His interpretation was that "he was not digging any deeper than 5 ft. at the point that they start constructing the footing for the wall." The retaining wall detail (Exhibit 4) does not show that the footings be dug 5 ft. deep.

The original retaining wall detail (Exhibit 3) was what he first bid the job on. It does not call for an excavation 5 ft. deep. As his workers proceeded to dig, he contacted the structural engineer to advise him that on the original plan it shows a footing and where "he showed it there was no footing." He was concerned that on the plan the deepest part of the footing (the key) is at such at a point that it tends to undermine the existing wall.

The structural engineer then came up with another plan (Exhibit 4) so not to undermine the existing wall. He brought the new plan to the Building Department and inquired if it was necessary to contact Cal/OSHA or any other agency. He was told "no" because the site had an exemption on file (Exhibit 5). He also observed that the City was constructing the same type of wall down the street so he asked questions of them to be certain that he was "obeying the same kind of procedures that were customary."

When Mr. Sousa came to the site sometime between December 5th and December 26th, he determined that they had to dig the footing excavation deeper because the soil was too loose. He questioned Mr. Sousa and returned to the Building Dept. to make sure he was still "in compliance." He contacted Mr. Pugh and he drew up a shoring detail (Exhibit B). During the shoring construction, he advised Mr. Pugh that he "had problems following the detail." They could not drive the 4 x 4 posts or the 2 inch pipes into the ground because there

were lots of rocks and bedrock in the soil. Mr. Pugh advised him to drive metal stakes into the ground, as depicted in Exhibit 12. He was also having the same problem driving the 4 x 4 vertical posts, which were adjacent to the existing retaining wall, into the ground. Mr. Pugh told him that "it was not that important, you can leave that out, because they have very little value in terms of support the existing wall."

When another City inspector came out to approve that stage of the job, he expressed concerns that Cal/OSHA had not been contacted. He advised them of the exemption and the inspector told him to contact Cal/OSHA to see if they would still consider this job exempt. Cal/OSHA inspected the job site. He subsequently expressed his concern to them "that if an exemption was issued how would he know at what point to contact them or know if the exemption, which called for no excavation more than 5 ft., was no longer in effect."

On cross examination, he stated that his employees erected the rebar depicted in Exhibits 17, 9 and 10, and they were in the excavation. He and his employees also dug the trench and the "key" which was "not quite 5 ft. deep, on an average." Employer's workers "never went 5 ft. deep."

Citation 1, Regulatory, § 341.1(a)

# **Findings and Reasons for Decision**

THE DIVISION ESTABLISHED A VIOLATION OF § 341.1(a) WITH PROOF, BY A PREPONDERANCE OF THE EVIDENCE, THAT EMPLOYER FAILED TO OBTAIN A PERMIT FOR AN EXCAVATION 5 FEET OR GREATER IN DEPTH INTO WHICH EMPLOYEES WERE REQUIRED TO DESCEND.

THE PROPOSED CIVIL PENALTY, WHICH WAS NOT RAISED AS AN ISSUE ON APPEAL, IS DEEMED REASONABLE.

Section 341.1(a) states, in pertinent part, that:

"Application for Permit. Any employer ... subject to § 341 of this article shall apply and obtain a permit, by filing a Permit Application Form with any Division's district or field offices." Section 341(a) states, in pertinent part, that:

"Employments which by their Nature Involve Substantial Risk of Injury: The Division shall require any employer who provides employment or a place of employment which by its nature involves a substantial risk of injury to obtain a permit prior to the initiation of any work, practice, method, operation or process of employment. Such employment or place of employment shall be limited to:

"(1) Construction of trenches or excavation which are 5 feet or deeper and into which a person is required to descend. ... "

Employer presented no evidence to support Mr. Evans' assertion that its employee's "never went 5 ft. deep" when excavating the footing for the new retaining wall. There was no testimony by Mr. Evans or any other witness for Employer that the footing excavation was measured by Mr. Evans at less than 5 ft. on the date of the inspection.

The Division presented compelling evidence that the excavation was 5 ft. or deeper as of the date of the January 9, 1996, inspection. Robert Sousa, a state licensed, registered geologist, who was contacted by either Employer or the home owner's agent to review the footing excavation, viewed the site and photographed the footing excavation on December 26, 1995 (Exhibit 17). He testified that as referenced in his review letter (Exhibit 7), the total or maximum depth on one end of the excavation was 5.5 ft. and on the other end, 5 ft. Therefore, his testimony that on December 26, 1995, he observed that the excavation was dug to the maximum depths is credited.

With respect to the excavation measurements by Mr. Foss, the Division's amended Citation 2 (Exhibit 1) alleges a violation of Section 1541(i)(2) rather than § 1541.1(a)(1), which pertains to the adequacy of protective systems as cave-in protection for excavations greater than 5 ft. deep. Since § 1541(i)(2) proscribes a "support system", such as underpinning, when an excavation is below the level of the base or footing of a retaining wall to ensure its stability, it is questionable whether or not the existing retaining wall, an adjacent structure, can be considered a "side" of the footing excavation for purposes of measuring the "overall height on that side of the excavation [at] approximately 12 feet", as done by Inspector Foss.

Although the existing retaining wall may well be part of the

footing excavation's "protective system" as that term is defined in Section 1540 and within the meaning of § 1541(i)(2), as the Division contended, it does not follow that the existing retaining wall is a "side" of the excavation. "Faces or sides" of an excavation is defined as: "The vertical or inclined earth surfaces formed as a result of excavation work" (§ 1540). An excavation is: "Any man-made cut, cavity, trench, or depression in an earth surface, formed by earth removal" (§ 1540). The existing retaining wall is not an "earth surface formed as a result of excavation work" but rather a previously existing wall constructed of In **Dalton Construction Co.**, OSHAB 83-717, man-made materials. Decision After Reconsideration (Feb. 21, 1986), the Appeals Board in cautioning against too narrow an interpretation of "earth" when determining the full scope and depth of an excavation, reasoned that "earth," in the definition of excavation, refers to all materials removed to form an excavation.

However, even if the existing retaining wall is not a side of the footing excavation, the measurements of the excavation taken by Mr. Foss are credited and establish the depth of the excavation at 5 feet or greater. He testified that he measured the depth of the excavation from the top of the rebar, which was a few inches below the patio slab next to the excavation, to the bottom of the slot at "approximately" 5 ft. He noted that the top of the rebar was "a matter of two or three inches maximum below the level of the patio cement."

In determining the applicability of § 1540(d), which prohibits entry into an unprotected excavation 5 feet deep or greater, the Appeals Board held that "depth is measured from the bottom of the excavation to the surface level." (*A.A. Portanova & Sons, Inc.*, OSHAB 83-981, Decision After Reconsideration (Mar. 19, 1986).) In *Dalton Construction Co.*, supra, where the employer was excavating an asphalt road to install a sewer line, the Board held that even the top layer of asphalt, pavement, and base rock had to be included in determining the full scope and depth of the excavation. As noted above, it reasoned that "earth", in the definition of excavation, refers to all materials removed to form an excavation. "Top layers of asphalt and base rock pose the same safety and health hazard as a top layer of hard or compact soil. Both present the danger of collapse on an employee." (*Dalton Construction Co.*, supra,)

Measuring the depth from the top of the patio cement slab next to the excavation, the excavation was greater than five feet. It is undisputed that Employer did not apply for or obtain a permit from Cal/OSHA for the footing excavation.

The Appeals Board has consistently held that an employer may be held responsible only for those violations to which one or more of its employees is exposed. (See <u>Red's Express</u>, OSHAB 81-1256, Decision After Reconsideration (Mar. 7, 1985).) The Division has the burden of proof of establishing exposure of such an employee as part of its prima facie case (<u>Moran Constructors, Inc.</u>, 74-0381, Decision After Reconsideration (Jan. 28, 1975), as well as the elements of its case by a preponderance of the evidence (<u>Howard J. White, Inc.</u>, OSHAB 78-741, Decision After Reconsideration (June 16, 1983) since Appeals Board hearings are civil in nature. (<u>Lee Bolin & Associates</u>, OSHAB 80-720, Decision After Reconsideration (July 29, 1981).)

At the hearing, Employer admitted that its employees worked in the excavation and had previously supplied a list to the Division of the laborers that worked in the excavation (Exhibit 18). An admission at a hearing is an adequate basis upon which to rest a finding of fact. (*C & S Battery & Lead*, OSHAB 77-0001, Decision After Reconsideration (Oct. 18, 1977).) Therefore, the Division having proved all of the elements of the cited safety order by a preponderance of the evidence, a violation of Section 341.1(a) is established.

It should be noted that Employer's continued reliance on the November 9, 1995, permit exemption (Exhibit A) after the December, 1995, inspections by the geologists and professional engineers from GeoConcepts, Inc., was misplaced. Employer had adequate opportunity to ascertain whether or not the footing excavation exceeded 5 feet in depth at the time its employees over-excavated and exposed the retaining wall foundation. Mr. Sousa's addendum report (Exhibit 7), which was delivered to the homeowner's agent, advised that "An OSHA Permit shall be obtained prior to resuming work as required by the City." It can reasonably be inferred that this report was made available to Employer. The shoring detail (Exhibit B), dated December 27, 1995, which Employer attempted to follow as its workers sought to shore the retaining wall, also contained the notation that it is approved subject to the condition that: "[P]rior to resuming any work, an OSHA permit shall be obtained and made available to Dept. inspector verification."

Since the proposed civil penalty was not raised as an issue on appeal, the \$875 proposed civil penalty is deemed reasonable.

## **Decision**

The appeal is denied and a civil penalty of \$875 is assessed against Employer.

Citation 2, Serious, § 1541(i)(2)

## **Findings and Reasons for Decision**

EMPLOYER'S EMPLOYEES WERE WORKING IN AN EXCAVATION BELOW THE LEVEL OF THE BASE OR FOOTING OF AN ADJACENT RETAINING WALL. AN ADEQUATE SUPPORT SYSTEM WAS NOT PROVIDED TO PROTECT ITS EMPLOYEES AND TO ENSURE **STABILITY** OF THE STRUCTURE. THE EXCAVATION WAS NOT IN STABLE ROCK AND A REGISTERED PROFESSIONAL ENGINEER DID NOT MAKE THE DETERMINATION THAT SUCH EXCAVATION WORK WOULD NOT POSE A HAZARD TO EMPLOYEES WORKING IN THE EXCAVATION. A VIOLATION OF § 1541(i)(2) IS **ESTABLISHED** 

THE VIOLATION WAS PROPERLY CLASSIFIED AS **SERIOUS** WHERE **THERE** WAS SUBSTANTIAL PROBABILITY OF **SERIOUS** HARM DEATH PHYSICAL OR  $\mathbf{IF}$ RETAINING WALL COLLAPSED AS A RESULT OF THE LACK OF AN ADEQUATE SUPPORT EMPLOYER, WITH THE EXERCISE OF REASONABLE DILIGENCE, COULD HAVE KNOWN OF THE VIOLATIVE CONDITION SINCE IT WAS IN **PLAIN** VIEW OF EMPLOYER'S OWNER WHO ASSISTED IN DIGGING THE EXCAVATION.

THE PROPOSED CIVIL PENALTY, WHICH WAS NOT RAISED AS AN ISSUE ON APPEAL, IS DEEMED REASONABLE.

Section 1541(i) "stability of adjacent structures" states under subsection (2) that:

"Excavation below the level of the base or footing of any

foundation or retaining wall that could be reasonably expected to pose a hazard to employees shall not be permitted except when:

- (A) A support system, such as underpinning, is provided to ensure the safety of employees and the stability of the structure; or
- (B) The excavation is in stable rock; or
- (C) A registered professional engineer has approved the determination that such excavation work will not pose a hazard to employees."

Employer does not dispute that the existing retaining wall was a "structure", within the meaning of § 1541(i), or that it was "adjacent" to the footing excavation for the proposed retaining wall, as evidenced by the Division's witnesses and augmented by the Division's photographs depicting the excavation on December 26, 1995, (Exhibit 17) and on January 9, 1996 (Exhibits 9 through 16). Where an element of an alleged violation must be proven and an Employer does not present any evidence that the element did not occur, the Division need only present evidence sufficient to establish that it is more likely than not that the violation existed. (*Gaehwiler Construction Company*, OSHAB 76-580, Decision After Reconsideration (Oct. 16, 1980).)

Nor does Employer dispute that the footing excavation for the proposed retaining wall was "below the level of the base or footing of any foundation or retaining wall..." [§ 1541(i)(2).] Robert Sousa, the state licensed, registered geologist, who was contacted by either Employer or the home owner's agent to review the footing excavation, testified credibly that the existing retaining wall foundation, or footing, was exposed to a depth of 18 inches with bedrock below it. This information was also contained in Mr. Sousa's addendum report (Exhibit 7).

Safety Engineer Foss testified that during the January 9, 1996, inspection he observed that the existing retaining wall was damaged by over-excavating in that the excavation was dug deeper then intended by the structural engineer so that the foot or base of the retaining wall foundation was exposed. This is consistent with Mr. Sousa's opinion and also establishes the threshold inquiry under § 1541(i)(2).

Employer did not refute the Division's proof with respect to the stability of the existing retaining wall. There was ample evidence to

support the Division's prima facia showing that excavation below the level of the base or footing of the existing retaining wall "could be reasonably expected to pose a hazard to employees" (1541(i)(2). Mr. Sousa testified that he viewed the site, photographed the footing excavation (Exhibit 17) and prepared an addendum report (Exhibit 7) on December 26, 1995. He observed that the retaining wall was damaged and leaning towards the house. Four pilasters were missing which removed the support that they would have provided.

Although Mr. Sousa stated that as of December 26, 1995, the existing retaining wall was an "adequate protective system", as noted in his report (Exhibit 7: page 2), he questioned its continuing integrity. "The excavation cannot remain open and not [be] braced. By December 26th, it has gone the period of time where it becomes highly questionable, something needed to be done. That is why the December 26, 1995, report (Exhibit 7: Geologic Addendum) was written." Furthermore, he opined that "by December 26th it was highly questionable whether the existing retaining wall was an adequate protective system because it was beyond the 15 days, the excavation was much deeper at that time, a total of 5.5 ft, and there was noncompacted fill that was exposed in the footings."

Mr. Sousa also reviewed the revised shoring detail prepared by Gwynne Pugh (Exhibit B). He opined that based on his training and experience as a geologist, that if the provisions outlined in his addendum and the revised shoring detail instructions were not followed, it could reasonably be expected that this could pose a hazard to employees or others who were working or standing below the existing retaining wall. His testimony is credited and supports a finding that excavating below the level of the footing of a structurally damaged, 7 ft. vertical retaining wall at the base of a hillside could be reasonably expected to pose a hazard to employees.

Employer did not contend that at the time of the January 9, 1996, inspection, the excavation was in stable rock. As noted in Mr. Sousa's original investigative report (Exhibit 6), the test bores that were done revealed natural soil (as depicted in Plate 2) and "fill" to the bottom of the base of the existing retaining wall (Plate 3). "Fill" is a combination of soil and rock that man has placed in a specific location: It is not natural. Therefore, he opined that the excavation for the retaining wall footing was not solely in bedrock or all in stable rock. The excavation exposed competent bedrock and dumped fill. This testimony, which is credited, eliminates exception (B) of § 1541(i)(2).

The exception denoted in subsection (C) was not addressed by Employer. Because the exception is an affirmative defense, the party raising the defense has the burden of proving each element (*Ernest W. Hahn, Inc.*, OSHAB 77-576, Decision after Reconsideration (Jan. 25, 1984); *Gal Concrete*, OSHAB 89-317, Decision After Reconsideration (Sept. 27, 1990) by a preponderance of the evidence. (*Central Coast Pipeline Construction Company, Inc.*, OSHAB 76-1342, Decision after Reconsideration (July 16, 1980).) Employer presented no evidence that it determined that the excavation work would not pose a hazard to its employees and this determination was approved by a registered professional engineer, as required by subsection (C).

In fact, the Division's evidence establishes that Mr. Sousa reached the opposite conclusion, to wit, that the existing retaining wall was a damaged structural element that threatened the safety of workers in the excavation. His addendum report was written to remedy the conditions he observed. It outlined certain mandatory provisions that governed the continuing project, one of which stated that "The foundation excavation/existing retaining wall shall be shored as required by the City of Los Angeles in Reference 1 (Review letter by the City of Los Angeles, Department of Building and Safety, dated December 21, 1995.] The report also noted that "A OSHA Permit shall be obtained prior to resuming work as required by the City."

Employer did not attempt to refute the Division's proof with respect to the adequacy of the retaining wall support system but rather contended that it was unable to comply with the shoring detail (Exhibit B) as designed by Mr. Pugh because it was difficult to drive  $4 \times 4$  posts or 2 inch pipes into the rocky soil and bedrock. Mr. Evans asserted that Mr. Pugh told him to drive metal stakes into the ground next to the braces, rather than the  $4 \times 4$  posts or pipes, and to ignore the requirement for  $4 \times 4$  vertical posts. However, these statements are inadmissible hearsay.

Under the rules of practice and procedure adopted by the Appeals Board, hearsay evidence is not "sufficient in itself to support a finding unless it would be admissible over objection in civil actions" (See Section 376.2).<sup>2</sup> A review of the exceptions to the hearsay rule set forth in the Evidence Code reveals that these statements do not come under any recognized exception and, therefore, cannot support

<sup>&</sup>lt;sup>2</sup>Section 376.2 states, in pertinent part, that: "Hearsay evidence may be used for the purpose of supplementing or explaining other evidence but shall not be sufficient in itself to support a finding unless it would be admissible over objection in civil actions."

Employer's claim. It is also highly doubtful that Mr. Pugh would advise Mr. Evans to ignore the written specifications in the shoring detail that had been prepared by him after a review of the site conditions, which included the existence of bedrock in the excavation.

Mr. Foss testified credibly that he reviewed the shoring detail (Employer's Exhibit B) during the Division's inspection and determined that the shoring system in place, as depicted in Exhibits 9 through 13, did not match the shoring detail requirements. In particular, he testified that Exhibits 11 and 12 show that the braces were not supported by 4 x 4 driven posts or 2 inch pipes, as called for in the shoring detail. The braces were supported by two steel form stakes driven into the ground along side the braces. He opined that the structural value of the braces was negligible since it was dependent only on the sheer strength of the soft iron nails holding the stakes in place.

Since the braces were not properly supported, it is established that Employer's shoring system was an inadequate support system<sup>3</sup>. The shoring system did not ensure the stability of the existing retaining wall structure and thereby ensure the safety of Employer's employees working in the excavation. Therefore, all of the requisite elements to establish a violation of § 1541(i)(2) were established.

To classify a violation as serious, pursuant to Labor Code Section 6432(a)] it must be established, by a preponderance of the evidence, that should an accident occur as a result of the violation, that there is a substantial probability that death or serious physical harm could result from a condition which exists from one or more of the practices used in a place of employment, unless an employer did not, and could not with the exercise of reasonable diligence, know of the presence of the violation. "Substantial probability" refers not to the probability that an accident will occur as a result of the violation, but rather to the probability that death or serious injury will result assuming an accident occurs as a result of the violation. [Labor Code Section 6432(b)] "Probability" is something likely to occur, substantial probability is something more likely to occur (or to be expected), than not." (*Abatti Farms*, OSHAB 81-0256, Decision After Reconsideration (Oct. 4, 1985).

<sup>&</sup>lt;sup>3</sup> A "support system" is defined as:

<sup>&</sup>quot;A structure such as underpinning, bracing, or shoring, which provides support to an adjacent structure, underground installation, or the sides of an excavation" (§ 1540).

"Serious injury or harm", as defined under Labor Code § 6302(h) and § 330(h), includes any employment related injury or illness that requires inpatient hospitalization for a period in excess of 24 hours for other than medical observation or that involves a loss of a member of the body or any serious degree of permanent disfigurement.

Mr. Foss testified that "when excavations collapse they usually do so rapidly and earth striking an individual will cause death or a serious injury that requires hospitalization in excess of 24 hours." This was based on his experience "investigated six excavations that collapsed with four fatalities and two instances where protective systems similar to this one failed", one of which resulted in a near fatality. It can reasonably be inferred that employees working in the excavation close to the 7 foot vertical retaining wall face would be unlikely to easily escape falling materials if the wall collapsed and would, to a substantial probability, suffer serious physical harm or death. Employer did not present any evidence to the contrary. Therefore, it is established that there was a substantial probability of serious physical harm to an employee if the existing retaining wall collapsed into the footing excavation because of the faulty shoring.

To prove the second element of a serious classification, the Division need not establish employer knowledge of a violation of a safety order but rather must establish actual or constructive knowledge of the violative condition. (*West Coast Steel*, OSHAB 81-0191, Decision After Reconsideration (May 15, 1985).) This element does not require that the employer have knowledge of the substantial probability of serious physical harm or death. (*Mission Linen Supply*, OSHAB 81-1564, Decision After Reconsideration (May 15, 1985).)

Although Mr. Foss neglected to offer an opinion on this issue, it is undisputed that the violative conditions, to wit, the improperly supported braces and exposed retaining wall footing were in plain view of Mr. Evans, who often worked in the excavation with the laborers. The Appeals Board has found that hazardous conditions, in plain view and visible to the naked eye, constitute serious violations since the employer could have known of them by exercising reasonable diligence. (See *Fibreboard Box & Millwork Corp.*), OSHAB 90-492, Decision after Reconsideration (June 21, 1991).) Also, the fact that Mr. Evans admitted that Employer used metal form stakes instead of 4 x 4 driven posts or 2 inch pipes, indicates knowledge of at least one of the violative conditions. A serious violation of § 1541(i)(2) is established.

Since the	proposed	civil penalty	y was not	raised as	an issue on
appeal, the \$262	25 propose	d civil penal	ty is deem	ed reasona	ıble.

DATED: March 2, 1997	
	BREF FRENCH
	Administrative Law Judge